

IN THE CLAIMS

Please amend the claims as follows:

1. (Currently Amended) A method comprising:

receiving at least one protocol state machine definition for a network protocol, said protocol state machine definition including a plurality of protocol state rules expressed in a text format;

parsing the at least one protocol state machine definition to form a set of parsed protocol state rules in a binary format, said parsed protocol state rules including at least one condition and at least one action associated with the condition, the at least one action comprising instantiation of a filter for the network flow from the set of filters and further the at least one action comprising saving the result of the at least one action for use in a later executed rule in the set of parsed protocol state rules;

storing a set of filters in a filter database;

receiving a network flow, said flow including a plurality of packets; [[and]]

applying one or more of the parsed protocol state rules to the plurality of packets in the network flow;

saving a result from at least a first rule of the parsed protocol state rules to create a saved result; and

executing a second rule of the parsed protocol state rules, wherein the second rule uses the saved result to determine a result for the second rule.

~~wherein the at least one action comprises the instantiation of a filter for the network flow from the set of filters and further wherein the at least one action comprises saving the result of the at least one action for use in a later executed rule in the set of parsed protocol state rules;~~

2. (Original) The method of claim 1, wherein the protocol state rules include rules for analyzing a context for the network flow.

3. (Original) The method of claim 2, wherein the context for the network flow includes an application layer context.
4. (Original) The method of claim 1 wherein the filter comprises a dynamic filter that is instantiated for the duration of the network flow.
5. (Original) The method of claim 1, wherein the filter comprises a static filter that is applied during an initiation of the network flow.
6. (Canceled)
7. (Currently Amended) The method of claim [[6]] 1, further comprising maintaining an expected state for the network flow utilizing the saved result.
8. (Original) The method of claim 1, wherein the at least one action comprises activating a rule in the set of parsed protocol state rules.

9. (Currently Amended) A system comprising:

one or more processors;

a parser ~~operable~~ executable by the one or more processors to parse at least one protocol state machine definition for a network protocol to a set of parsed protocol state rules in a binary format, said protocol state machine definition including a plurality of protocol state rules expressed in a text format, said parsed protocol state rules including at least one condition and at least one action associated with the condition, the at least one action comprising instantiation of a filter for the network flow from the set of filters and further the at least one action comprising saving the result of the at least one action for use in a later executed rule in the set of parsed protocol state rules;

a filter database operable to store a set of filters in a filter database; and

a protocol analysis engine ~~operable~~ executable by the one or more processors to:

receive a network flow, said flow including a plurality of packets, ~~[[; and]]~~

apply the parsed protocol state rules to the plurality of packets in the network flow ~~[[;]]~~,

save a result from at least a first rule of the parsed protocol state rules to create a saved result; and

execute a second rule of the parsed protocol state rules, wherein the second rule uses the saved result to determine a result for the second rule.

~~wherein the at least one action comprises the instantiation of a filter for the network flow from the set of filters and further wherein the at least one action saves the result of the at least one action for use in a later executed rule in the set of parsed protocol state rules.~~

10. (Original) The system of claim 9, wherein the protocol state rules include rules to analyze a context for the network flow.

11. (Original) The system of claim 10, wherein the context for the network flow includes an application layer context.

12. (Original) The system of claim 9 wherein the filter comprises a dynamic filter that is instantiated for the duration of the network flow.

13. (Original) The system of claim 9, wherein the filter comprises a static filter that is applied during an initiation of the network flow.

14. (Canceled)

15. (Previously Presented) The system of claim 9, wherein the at least one action deactivates a rule in the set of parsed protocol state rules.

16. (Original) The system of claim 9, wherein the at least one action comprises activates a rule in the set of parsed protocol state rules.

17. (Original) The system of claim 9, wherein the protocol analysis engine is further operable to maintain a state table for the network flow.

18. (Currently Amended) A tangible machine readable medium storing machine executable instructions for performing a method comprising:

receiving at least one protocol state machine definition for a network protocol, said protocol state machine definition including a plurality of protocol state rules expressed in a text format;

parsing the at least one protocol state machine definition to form a set of parsed protocol state rules in a binary format, said parsed protocol state rules including at least one condition and at least one action associated with the condition, the at least one action comprising instantiation of a filter for the network flow from the set of filters and further the at least one action comprising saving the result of the at least one action for use in a later executed rule in the set of parsed protocol state rules;

storing a set of filters in a filter database;

receiving a network flow, said flow including a plurality of packets; [[and]]

applying the parsed protocol state rules to the plurality of packets in the network flow;

saving a result from at least a first rule of the parsed protocol state rules to create a saved result; and

executing a second rule of the parsed protocol state rules, wherein the second rule uses the saved result to determine a result for the second rule.

~~wherein the at least one action comprises the instantiation of a filter for the network flow from the set of filters and further wherein the at least one action comprises saving the result of the at least one action for use in a later executed rule in the set of parsed protocol state rules.~~

19. (Original) The machine readable medium of claim 18, wherein the protocol state rules include rules for analyzing a context for the network flow.

20. (Original) The machine readable medium of claim 19, wherein the context for the network flow includes an application layer context.

21. (Original) The machine readable medium of claim 18 wherein the filter comprises a dynamic filter that is instantiated for the duration of the network flow.

22. (Original) The machine readable medium of claim 18, wherein the filter comprises a static filter that is applied during an initiation of the network flow.

23. (Canceled)

24. (Original) The machine readable medium of claim 18, wherein the at least one action comprises deactivating a rule in the set of parsed protocol state rules.

25. (Original) The machine readable medium of claim 18, wherein the at least one action comprises activating a rule in the set of parsed protocol state rules.